Rationale for the Transportation Funding Formula

Every state government collects revenue for transportation and distributes the funds over some or all of its transportation system. This report examines Michigan's system for distributing transportation funds, compares it with other states' systems, and compares it with some suggested alternatives.

In this chapter we will examine the necessary functions of a transportation funding formula. These primarily include the need to:

- Balance funding for mobility and access
- Provide for various transportation options
- Ensure stability and predictability
- Ensure good stewardship of public assets

BALANCE FUNDING FOR MOBILITY AND ACCESS

Transportation has two functions: to provide *mobility* and *access*.

Access: to each usable piece of property in the state, allowing land to be used productively, and letting people reach their homes and other places.

Mobility: for people and goods, giving people greater economic opportunity, moving goods to broader and better markets, and enabling the delivery of services.

Roads, in particular, form a hierarchy based on their contribution to one or the other of these functions. This hierarchy is the primary basis of the funding formula. Figure 2.1 A on the next page illustrates the various functional classes one might encounter on a typical trip.

Road Functional Classification

The Federal Highway Administration imposes a standard classification on the nation's road system, called National Function Classification (NFC). The logic of functional classification is key to understanding basic road finance. Here is how Michigan's roads are divided among the various levels of importance in the NFC:

BROAD N.F.C. CATEGORIES AND JURISDICTION

Broad NFC Categories and Jurisdiction: Route Miles

National Functional Classification	Jurisdiction			
	State	County	City	Total
Interstate and Other Freeways	1,945	0	0	1,945
All Other Arterials	7,269	4,827	2,172	14,268
All Collectors	428	21,854	2,144	24,426
Local-Access Roads & Streets	14	62,568	16,714	79,296
Total	9,656	89,249	21,030	119,935

Sources: Michigan Geographic Framework, Version 2009 and Preliminary

MDOT Sufficiency Report of 2009

Arterial roads **contribute the most to statewide or regional mobility. This includes Interstate and other freeways, principal, and minor arterials. Arterial roads may be urban or rural, depending on location (within or outside urban boundaries developed cooperatively between MDOT and local agencies, subject to FHWA approval.)**

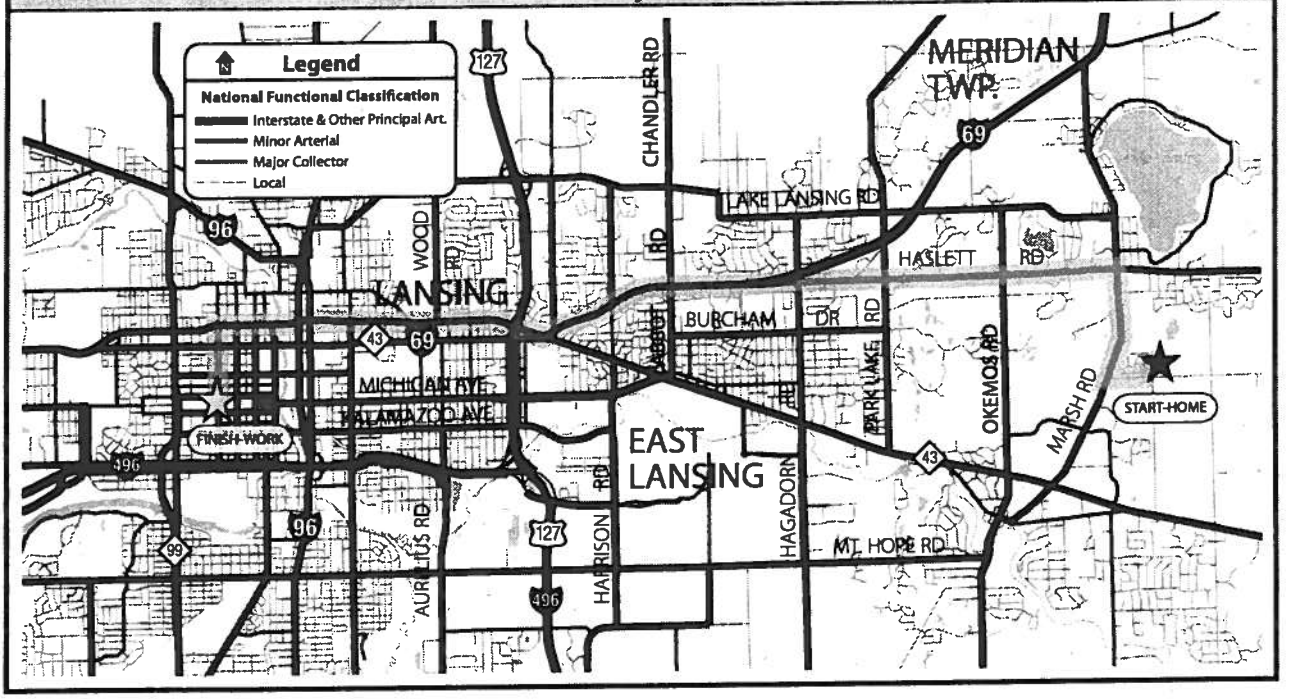
Collector roads **accumulate the traffic generated on local roads and distribute it on to arterial roads. Collectors perform a mixed mobility and property-access role. Sub-classifications are *urban collectors, rural major collectors,* and *rural minor collectors.***

Local-access roads and streets **give access to individual parcels of property, almost exclusively. They contribute little to statewide or regional mobility. Most trips originate or end on local-access roads, but most road users do most of their traveling on collectors and arterials. As with other roads, local-access roads may be rural or urban.**

TYPICAL TRIP BY FUNCTIONAL CLASS

Figure 2.1 A

For a 10-Mile Journey From Home to Work



REVENUE GENERATED BY ROAD SEGMENTS ANNUALLY

Figure 2.1 B

(Daily Traffic Volume x 0.025 x length x 365)